

**ARIZONA GAME AND FISH DEPARTMENT
HERITAGE DATA MANAGEMENT SYSTEM**

Animal Abstract

Element Code: ABNKC06010

Data Sensitivity: No

CLASSIFICATION, NOMENCLATURE, DESCRIPTION, RANGE

NAME: *Elanus leucurus*

COMMON NAME: White-tailed Kite, Black-shouldered Kite, White Hawk

SYNONYMS: *Elanus caeruleus*; *Milvus leucurus*

FAMILY: Accipitridae

AUTHOR, PLACE OF PUBLICATION: *Milvus leucurus* Vieillot, Nouv. Dict. Hist. Nat., nouv. ed., vol. 20, May 1818, p. "556" [misprint = 563]. (AOU, 1957).

TYPE LOCALITY: Paraguay.

TYPE SPECIMEN:

TAXONOMIC UNIQUENESS: Constitutes a super species with *E. leucurus* and *E. axillaries* (AOU 1998); the three species were treated as conspecific by (AOU 1983). Sibley and Monroe (1990) regarded the three taxa as distinct species. Clark and Banks (1992) emphasized that American *Elanus* differs from Old World kites in greater size and weight, in proportions (relatively longer tail and small bill and feet), plumage pattern (particularly of juveniles), and in behavior; they argue that these differences are sufficient to warrant recognition of *E. leucurus* as a distinct species (NatureServe 2001).

DESCRIPTION: A delicate, graceful, gull-like bird of prey. Largely white, with a gray back, black patch on shoulder and undersurface of the pointed wing, and a long squared off white tail. They have tern like plumage with pointed wings that are usually held in dihedral. The juvenile's under parts and head are lightly streaked with rufous, which rapidly fades. Females have darker backs. In all ages, black shoulders show in flight as black leading edge of inner wings from above, small black patches from below. The sexes are similar. Their length is 15 in (38 cm), the wingspan is 39 in (99 cm), and they weigh 12 oz (340 g). They have a short dark hooked beak; a red eye and their legs are a buffy yellow. They often dangle their feet in flight

AIDS TO IDENTIFICATION: Gulls and terns are similar in coloration but lack black shoulder and wrist marks and has a different bill shape. The Mississippi Kite (*Ictinia mississippiensis*) has a similar shape, but is much darker in all plumages, never having a white breast, white tail or the black shoulder or wrist marks of the White-tailed Kite.

ILLUSTRATIONS: Color drawing (National Geographic 1999)
Color drawing of egg (Baicich 1997, pl 28)

Color drawing (Sibley 2000)

Color photos (Farrand, 1988: p. 219)

Color photo (Bentsen *in*

<http://www.enature.com/fieldguide/showSpeciesIMG.asp?imageID=17655>

Color photo of juvenile in flight (Danzonbaker *in*

<http://www.avesphoto.com/website/NA/species/KITWTL-1.htm>)

Color photo (LaTourrette *in*

<http://www.birdphotography.com/species/wtki.html>)

Color photo (The Otter Side *in* <http://www.otterside.com/htmlfiles/k5-thm>)

TOTAL RANGE: According to NatureServe (2001), they are residents from southwestern Washington south to northwestern Baja California, in Florida (small population), and from southern Texas south through Mexico to South America (northern Columbia to Guianas, eastern Brazil through Paraguay, northern Argentina, and Chile. Also, there has been recent breeding in Arizona, Oklahoma, Kansas, Louisiana, Mississippi and the southern U.S.

RANGE WITHIN ARIZONA: Occurs along or south of the Gila River and in southern Arizona. Has been documented in La Paz and Cochise counties.

SPECIES BIOLOGY AND POPULATION TRENDS

BIOLOGY: In northwestern California, communal roosting occurs in the fall and winter, the location of roost may shift during this period. They tend to move seasonally but evidence of actual migration is lacking. Their voice is varied with a mellow/yelp *eerk, eer...*; high thin, rising whistle followed by low, dry, harsh notes *sweeekrrrrr*. In aggression a low, grating *karrrr*. The juvenile gives an Osprey-like whistle *teewp*. They are generally not territorial but the nest site may be defended against crows, other hawks, and eagles. Jays, crows, yellow-billed magpies, raccoons and opossums may rob the nest. Great horned owls may prey on adults and young. The maximum life span recorded is 5y 11 mos for a banded bird that was shot.

REPRODUCTION: The breeding season begins mid-February, and probably ends early July. They breed in open country-cultivation, meadows and marshes-with scattered trees. They nest in a tree, often near a marsh, usually 6-15 m (20-49 ft) above the ground in the branches near the top of a tree. Generally builds a new nest for each clutch. Several pairs may nest in nearby trees. Old nests of other birds may be used as nest foundation. The nest is a loose but well-built twig structure, lined with dry grass, roots, Spanish moss and other plant material. For second broods a second nest is built on a different site. The female builds the nest but the male may initiate the building behavior. The outside diameter of the nest is 20 in (50 cm), and the inside diameter is 7 in (18 cm). There are usually 4-5 eggs and they are short sub elliptical, smooth, and non-glossy or slightly glossy. They are also white or faintly buffish, very heavily mottled and blotched

overall with deep reddish-brown, more concentrated towards the larger end, while ground color becomes buff-tinted, 42-33 mm. Only the female performs the incubation while the male remains nearby and feeds the female for 28-30 days. The nestlings are semi-altricial and downy. The first down is short, whitish tinged with pinkish-buff on the back. The second down is bluish-gray. The female tends the young, but all of the food is brought by the male and passed to the female away from the nest. The female tears up the food for the first 24 days. The young fly at 35-40 days, but may return to nest to feed or brood. The first brood is tolerated until the second brood has hatched in a different nest. Some may breed at one year.

FOOD HABITS: Their diet in the U.S. is almost exclusively voles and mice with the pocket gopher as a sometime secondary item. But also occasionally feed on birds, insects, reptiles and amphibians. They hunt mostly in the early morning and late afternoon. They hover while hunting, unlike any other North American kite. They soar, glide and hover less than 30 m (100 ft) above the ground in search of prey. Slowly descends vertically upon prey with wings held high and legs extended, rarely dives into tall cover.

HABITAT: Savanna, open woodland, marshes, partially cleared lands and cultivated fields, mostly in lowland situations.

ELEVATION: In Arizona they have been found from 1,800-4,150 ft (548-1264 m), AGFD HDMS unpublished database records (accessed 2002).

PLANT COMMUNITY:

POPULATION TRENDS: According to NatureServe (2001), this kite was nearly extinct in the U.S. by 1930 or earlier, but has since reoccupied its former principal range and has expanded into Middle America. According to Dunk (1995, *in* The Birds of North America), many North American populations of the White-tailed Kite have declined during the 1980's and 1990's, apparently because of habitat loss and perhaps increased disturbance.

SPECIES PROTECTION AND CONSERVATION

ENDANGERED SPECIES ACT STATUS:

STATE STATUS:

OTHER STATUS:

MANAGEMENT FACTORS: Loss of grassland habitat and disturbance may pose a threat to this species. Also threatened by being mistaken for other birds during hunting season.

PROTECTIVE MEASURES TAKEN: In northern California, the California Fish and Game Department purchased previously grazed grasslands and largely removed them from grazing.

These areas now support large populations of voles and high densities of wintering White-tailed Kites; approximately 10 times the raptor density they supported prior to establishment.

SUGGESTED PROJECTS: Biochemical analysis or DNA tests need to be performed to determine the taxonomy of the genus *Elanus*. Also, according to Dunk (1995, *in* The Birds of North America), an accurate assessment of White-tailed Kite population trends within large geographic areas is critically needed. During the breeding season, examination of nest-site selection and competition for nest sites with corvids or other raptors would be useful. As well as an examination of nest site availability in areas with few trees would be useful. Additional data are needed on kite survivorship and other demographic parameters.

LAND MANAGEMENT/OWNERSHIP: State Land Department, BLM-Tucson Field Office

SOURCES OF FURTHER INFORMATION

REFERENCES:

- American Ornithologists' Union (AOU). 1957. Check-List of North American Birds. Fifth Edition. American Ornithologists' Union, Port City Press, Inc., Baltimore, MD. P. 100.
- Baich, P. J. et al. 1997. A Guide to the Nests, Eggs, and Nestlings of North American Birds. Second Edition, Natural World Academic Press, San Diego, California, pp. 92-93, pl 28.
- Bentsen, S. White-tailed Kite Available:
<http://www.enature.com/fieldguide/showSpeciesIMG.asp?imageID=17655>.
- Brown, L. & D. Amadon. 1968. Eagles, Hawks and Falcons of the World. Country Life Books, pp. 236-240.
- California Department of Fish and Game. Available: <http://www.dfg.ca.gov/whdab/B111.html>
- Danzenbaker, M. 1999. White-tailed Kite. Available:
<http://www.avesphoto.com/website/NA/species/KITWTL-1.htm>
- Dunk, J.R. 1995. White-tailed Kite (*Elanus leucurus*). *In* The Birds of North America, No. 178 (A. Poole and F. Gills, eds.). The Academy of Natural Sciences, Philadelphia, and The American Ornithologists' Union, Washington, D.C.
[Http://www.mbr-pwrc.usgs.gov/id/fram1st/Idtips/h3280id.html](http://www.mbr-pwrc.usgs.gov/id/fram1st/Idtips/h3280id.html)
- Johnson, T.B. 1987. Arizona Wildlife Views. Arizona Game and Fish Department, Phoenix, Arizona, April 1987.
- LaTourrette, P. 2000. Available: <http://www.birdphotography.com/species/wtki.html>
- Mark, David. 2000. Black-shouldered Kite confusion. Available:
<http://mail.geneseio.edu/pipermail/geneseebirds-1/2000-May/000524.html>
- National Geographic. 1999. Field Guide to the Birds of North America. National Geographic Society, Third Edition, Washington D.C. pp 104-105.
- NatureServe Explorer: An online encyclopedia of life [web application]. 2001. Version 1.6. Arlington, Virginia, USA: NatureServe. Available: <http://www.natureserve.org/explorer>. (Accessed: November 22, 2002).

- Sibley, D. A. 2000. The Sibley Guide to Birds. Alfred A. Knopf, New York, New York, pp 61.
- Terres, J.K. 1980. The Audubon Society. Encyclopedia of North American Birds. Alfred A. Knopf. p.489.
- The Otter Side, Available: <http://www.otterside.com/htmfiles/k5-thtm>.
- University of Iowa. 2000. Population Genetics of the White-tailed Kite. Available: http://www.uiowa.edu/~nathist/Site/Population_Genetics_White-Tailed_Kite/population_genetics_white-tailed_kite.html.

MAJOR KNOWLEDGEABLE INDIVIDUALS:

ADDITIONAL INFORMATION:

The genus name is Latin from Greek *elanos*, kite and *elauno*, to drive. The species name is Latin from Greek *leukos*, white, and *oura*, tail.

The White-tailed Kite was almost extirpated from the U.S. in the early quarter of the 1900's through persecution (shooting) by man.

Currently the University of Iowa's Museum of Natural History is working with 40 other museums to solve the mystery of the taxonomy of the White-tailed Kite. Since the 1940's the population has increased into the southeast. But researchers want to know which subspecies has moved into the area. To determine this, DNA samples are being taken from White-tailed Kites in museums which are known to have come historically from the southeast. They are comparing that DNA information to samples from the birds living there today.

Revised: 2002-11-29 (AMS)
2002-12-06 (SMS)

To the user of these abstracts: you may use the entire abstract or any part of it. We do request, however, that if you make use of these abstracts in plans, reports, publications, etc. that you credit the Arizona Game and Fish Department. Please use the following citation:

Arizona Game and Fish Department. 20XX (= **year of last revision as indicated at end of abstract**). X...X (= **taxon of animal or plant**). Unpublished abstract compiled and edited by the Heritage Data Management System, Arizona Game and Fish Department, Phoenix, AZ. X pp.